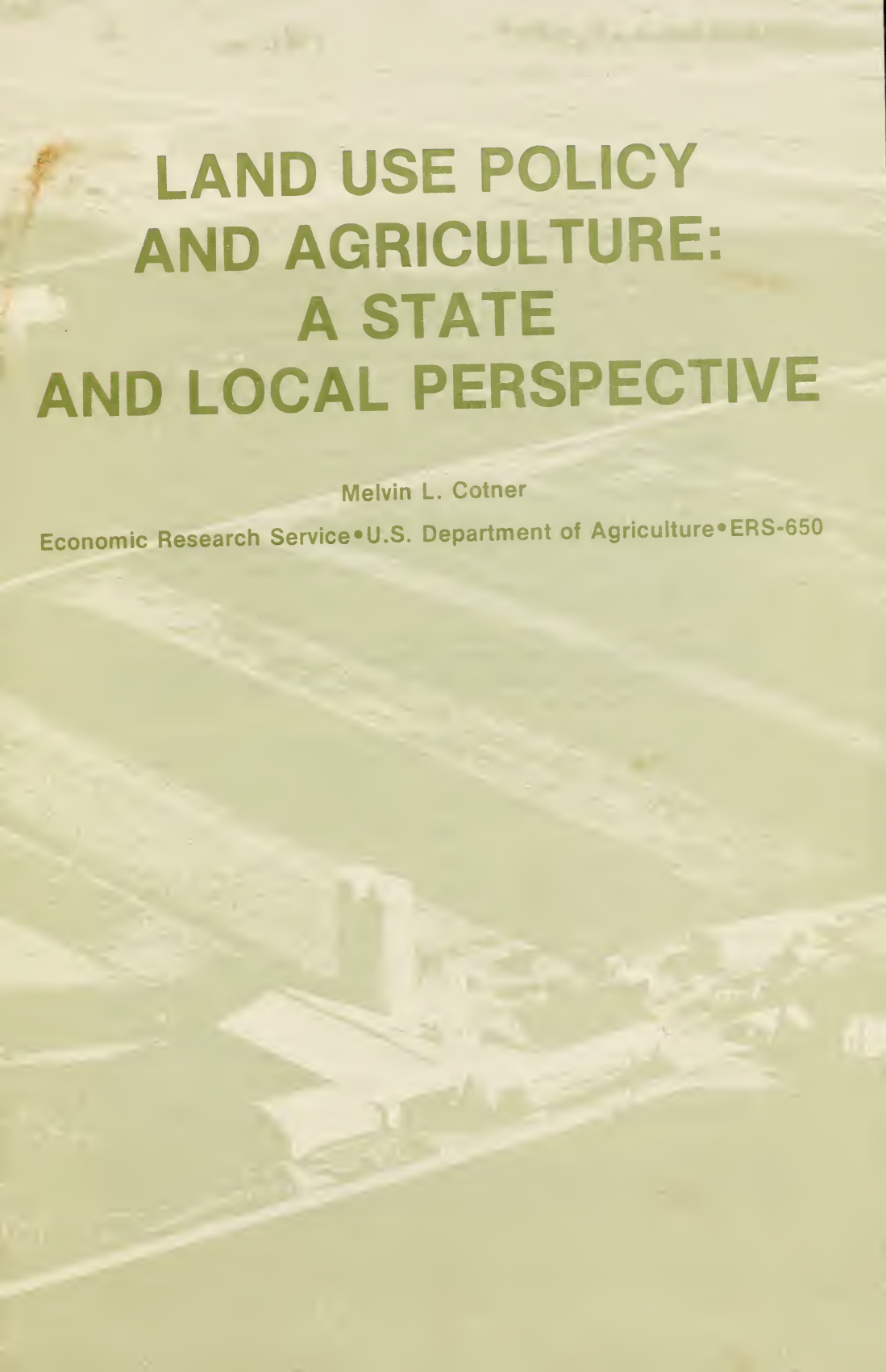


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An aerial photograph of a rural landscape, likely in the Midwest, showing a large farmstead with several buildings, including a prominent white barn, and surrounding fields. The image is in a sepia or light brown tone, giving it a historical or archival feel.

LAND USE POLICY AND AGRICULTURE: A STATE AND LOCAL PERSPECTIVE

Melvin L. Cotner

Economic Research Service • U.S. Department of Agriculture • ERS-650

PREFACE

The United States is not running out of farmland. We will be able to meet anticipated domestic food needs plus moderately high export demands. The most compelling reasons for worrying about the conversion of farmland to other uses come not from the national food production perspective but from the State and local perspective on agriculture's importance to them.

Local land use issues abound. These issues are wrapped in conflicting and interwoven desires, ideas, and rights. They touch such sensitive areas as income and local employment, taxation, air and water quality, and just plain personal wishes to be left alone.

The Federal Government encourages land use planning and recognizes an important support role by USDA involving research and information on land use. But, planning and implementation are up to States and local jurisdictions.

This paper reviews land use policy issues from a State and local perspective. It is a sequel to the author's July 1976 paper entitled *Land Use Policy and Agriculture: A National Perspective*. Copies are available from ERS Publications, Rm. 0054-S, U.S. Department of Agriculture, Washington, D.C. 20250.

LAND USE POLICY AND AGRICULTURE: A STATE AND LOCAL PERSPECTIVE

*Melvin L. Cotner**

A Washington, D.C. newspaper recently reported the problems of two sets of landowners—one fighting and the other inviting development.

A group of farm owners in Loudoun County, Va., near Washington, petitioned their county government to designate some 16 square miles of their land as an historical preservation district. With dirt roads, one-lane bridges and old style homes, the area in many ways reflects the life style of the petitioners' Quaker ancestors who settled there in the 1730s. With its proximity to Washington, the land has prime development potential. The developers are fighting the proposition.

The next day, the paper reported another land use dispute where some Maryland landowners adopted a position 180 degrees from the Loudoun County owners.

The State of Maryland, attempting to preserve the whitewater section of the Youghiogheny River, wants to limit development on private land along the watercourse. The landowners object to this wild-river legislation as an infringement on their personal right to decide the use of their land.

These cases vividly illustrate the complex, emotion-filled land use issues arising in communities across the Nation. They are issues wrapped in conflicting and interwoven desires, ideas, and rights. They touch sensitive areas such as income and local employment, taxation, air and water quality, and just plain personal wishes to be left alone. And, the land use debates frequently focus on the danger of running out of food-producing land—an issue that requires a national perspective.

This paper first puts the national food capacity argument into perspective. Then it addresses the agricultural land use issues at the State and local level and some of the recent activities of the U.S. Department of Agriculture relating to these problems.

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The United States is not running out of farmland nor is its agricultural productivity being compromised. We will be able to meet anticipated domestic food needs plus moderately high export demands. But the pressure is on.

World population has raced past 4 billion and may reach 7 billion by the end of this century. Most of the increase will be in the developing nations—those least able to feed themselves. Higher levels of commercial and food aid exports are likely, placing added stress on our agricultural capacity.

An even more important demand factor than the multiplying population is the worldwide growth in incomes. Greater wealth and higher incomes usually produce an accelerated demand for animal protein diets. This cannot help but spur the demand for feed grains, a demand that U.S. farmers have a special facility for meeting.

In addition to these stress factors, increased competition for land is likely to multiply pressures on our agricultural land base. Strip mining, industrial and municipal inroads on irrigation water supplies, and urbanization are a few examples.

Farmers are now cropping about 367 million acres, and are edging toward the upper limits of the cropland readily available for use. Our current cropland base is 385 million acres (excluding cropland used for pasture).

We think, though, that our cropland base will hold up under the stress of the added food demand and competing uses. We lose about 2.7 million crop acres a year—500,000 of those go to urbanization and development of public facilities while 2.2 million are converted to more extensive uses such as grass and trees. Some land is left idle because of low soil fertility, terrain unsuited to modern machinery, and small uneconomic fields.

However, we are adding about 1.3 million acres a year to the nation's cropland base. This comes about through expanded irrigation, drainage, land clearing, and development of dryland farming. We face, then, about a 1.4-million-acre net loss in cropland each year.

Crop yields have probably increased because of changes in cropland. Much of the new cropland has been developed on more productive soils and land better adapted to improved technology. The land dropped from production has mostly been of lower productive quality.

In addition to the 385-million-acre cropland base, there are as many as 266 million tillable acres currently in pasture, forest, and other uses. Over 100 million of them are physically good enough to convert into cropland within a decade or two. About a fourth of this acreage could be brought into production with minimum investment. The remaining acreage would require conservation measures and would tend to be less productive land.

Given existing and foreseeable conditions we see no crisis in the national farmland situation. Nevertheless, we must be careful. Well-considered policies concerning farmland use and conservation are vital. Potentially important future constraints on production include: higher energy costs, restricted water availability, unfavorable weather, increased costs of nonland inputs, environmental restrictions, a declining rate of advancement in agricultural technology, continued conversion of productive farmland to nonagricultural uses, and volatile export demands. Enough technical know-how is in the pipeline to allow our agricultural productivity to increase, albeit at a dampened rate.

Agricultural land use important to local areas

Under the Constitution, States hold land use regulatory powers. Recent attempts to enact Federal land use legislation were not meant to negate State responsibilities. To the contrary, the intent of these bills, none of which passed, was to encourage more involvement and improved land use planning at the State and local level.

Federal agencies nonetheless influence the use of land through their spending programs and technical assistance and information activities. For example, airport and highway construction programs of the U.S. Department of Transportation influence land use beyond the acres taken for actual construction. Sewer and water facility loans of the U.S. Department of Agriculture influence where and how urbanization takes place in rural areas. The interrelated authorities, responsibilities, and functions of our local-to-Federal governmental structure, along with the diverse interests in land use, make land use planning activities extremely complex and controversial.

Despite the Federal Government's influence on local land use, it cannot resolve most local issues. The practical decisions on how land is to be used must be made by local citizens.

Perhaps the most compelling justification for increased concern about the protection of agricultural land comes not from the need to insure adequate food production in the future, which is largely a national issue, but from the State and local issues. These issues—economic, social, and environmental—are directly affected by agriculture. And, unless the important linkages between agriculture and the economic, social, and environmental aspects of each community are fully recognized in local planning efforts, agriculture itself may decline because of neglect rather than design. Many farms have gone out of business for economic reasons. The absence of an effective land use policy near cities may hasten this trend.

The impact of agriculture on the *social structure* should be fully appreciated by land use planners. Local development is often accompanied by changes in farmland ownership which are unprecedented in the community. Urbanization or a trend toward highly commercialized agriculture may upset a longstanding pastoral lifestyle. This is the threat facing the Loudoun County farm owners noted in our introduction. Land use planning groups must recognize that their local lifestyle relies greatly on the type of agriculture surrounding them.

Sometimes agriculture is not a good neighbor from an *environmental* viewpoint. This may simply mean that the new nonfarm resident is suddenly aware that the east wind makes the pig farm next door a very smelly neighbor. The point is that many land uses, interspersed, may conflict and one use will be the loser. Local decisionmakers may not consciously be trying to banish farming from the area. But, such urban-rural interaction may have that effect.

As urbanization proceeds and as the numbers of nonfarm, rural residents grow, there will be conflicts on the environmental issues. The importance of agriculture to the community must be determined at an early stage of the planning and decision processes. Agriculture in many instances can be a good environmental neighbor. For example, Los Angeles depends upon surrounding agriculture to absorb its city wastes. Wastewater is used to irrigate avocados in nearby farm areas. In other places, solid organic wastes are being recycled into the soil. Furthermore, farmlands provide open space and scenic beauty.

Uncertain growth patterns and unclear land use planning may directly affect the *economic health* of the community by hampering, even injuring, local agriculture.

Uncertain growth patterns: One economic issue facing farmers near cities is the uncertainty over the future path of nonfarm growth. Any real or even imagined change in the community, such as more intensive residential, commercial, or industrial uses, will likely generate a speculative whirl in the local economy. Farmers will be part of it. Unsure about whether their farms will survive against other economic alternatives, farmers will hesitate to make important capital investments. Their investments—in milking parlors, for example—would become valueless if the farm were converted to a suburban tract. Such uncertainties over the timing and location of development will naturally reduce investments in farm improvements. The farm operation could cease as a result of uncertainty and economic neglect, rather than any conscious land use policy.

Critical mass effect: Closely allied to the concern about a viable farm base is the problem of *critical mass* within the local region. The volume of farm production in a locality, and the accompanying demand for inputs, can erode to the point where firms dealing in machinery, fertilizer, or other farming essentials can no longer service farmers at a reasonable cost. Improved transportation systems and bulk handling may enlarge service areas. But some type of incentive or regulation may be required to maintain the agricultural volume or critical mass needed to preserve access to local input and output markets.

Rising taxes: A real pocketbook issue concerning agricultural land use is the property tax. An urbanizing community naturally faces higher public service costs and the need for higher tax revenues. These higher taxes are typically spread across the entire property tax base. Farmland, then, is often valued for assessment at a rate reflecting its development potential rather than its current use. Escalating farm tax bills may drive the farms out of business, the victims of tax policy neglect, rather than a conscious land use policy.

USDA has a support role—research and information

While State and local governments have the primary responsibility in land use matters, USDA has a significant role in supporting the land use policymaking process. A recent USDA seminar on the retention of prime lands recommended that:

1. *USDA should be an advocate for the conservation of agricultural lands and should encourage State and local governments to undertake efforts to give full consideration to agricultural and forest lands in their land use decisions.* The Secretary of Agriculture subsequently issued a memorandum (No. 1827, Supplement 1) on USDA's agricultural land use policy (see appendix).
2. *USDA should initiate efforts to have prime agricultural and forest lands explicitly considered in environmental impact statements.* As a result of the USDA initiative, the Council on Environmental Quality has directed all Federal agencies to include agricultural land considerations in environmental impact statements.

3. *USDA should encourage the establishment of a land resources council to coordinate Federal programs affecting the use of land. Such a council might be patterned after the Water Resources Council.*
4. *USDA should take action to improve the data base on nonurban lands. Many agencies collect land use data. Such collections should be coordinated so that users nationwide can have access to a consistent set of data with similar assumptions, definitions, and format.*
5. *USDA should intensify its land use research. Improved data on the supply, availability, and use of land, as well as the demand for land, would be useful for local decisions about policies and plans for land use.*

Multi-disciplinary research is needed in a number of areas which relate closely to State and local issues:

- *More information about resource ownership:* Conflicts in resource use might be more readily resolved if we knew more about the characteristics of the owners and their plans for their land. We also need a clear understanding of subsurface ownership rights as well as surface rights.
- *Competitive forces for land:* Rising nonfarm populations and expanding energy and mineral development illustrate the competitive and often conflicting demands for agricultural land. Policymakers need a sharp and continuing assessment of these trends.
- *Urban influences on land use:* Direct urban competition for land and the indirect impact of urbanization on agriculture are particularly complex subjects which demand more research and information. Speculative land values, sewer and water facility requirements, the critical mass problem we discussed earlier: these are but a few of the urbanization issues we need to know more about.
- *Investments to improve farmland:* Decisions to develop, improve, or even retire farmland have important economic and social consequences beyond the farmer. Supporting agricultural industries are affected as is the surrounding community. Depending on the scope of these decisions, the national capacity to produce food may even be affected. Such adjustments need careful analysis as steps are taken to minimize their social costs.
- *The decisionmaking base:* Land use decisions are becoming more complex and affect a greater variety of public and private interests. Steps must be investigated for assuring that broad interests are represented in the decisionmaking process.
- *Legal mechanisms that affect land use:* Improved tools are needed to help regulate or influence the use of land. What are the potential roles of state-wide zoning, transferrable development rights, sanctions and incentives, and taxes and other costs connected to intergenerational property transfers? We must judge the effectiveness of these tools and suggest improvements.
- *Federal legislation on pollution levels:* State and local governments will need direct research and information support as Federal environmental regulations are applied at the local level. Restrictions on surface water runoff, application of farm and urban waste on land, agricultural chemicals, and other environmental issues can influence land use patterns.

The Federal Government, through its numerous cost-sharing, credit, and regulatory programs, has a pervasive but indirect influence on how land is used in this country. The direct authority and appropriate level of action relating to land use policy resides at the State, county, and local levels. For the authority to be exercised effectively and equitably, officials must carefully examine their goals and objectives and then determine the role for agriculture. USDA encourages land use planning and recognizes an important support role involving research and information on land use policy.

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APPENDIX

UNITED STATES DEPARTMENT OF AGRICULTURE OFFICE OF THE SECRETARY WASHINGTON, D.C. 20250

June 21, 1976

SECRETARY'S MEMORANDUM *No. 1827, Supplement 1*

Statement of Prime Farmland, Range, and Forest Land

The continued loss of lands well suited to the production of food, forage, fiber, and timber, and the degradation of the environment resulting from those losses is a matter of growing concern to the Nation. Major consideration must be given to prime lands and the long-range need to retain the productive capability and environmental values of American agriculture and forestry. Developments that result in irreversible land use changes represent a loss of valuable natural resources. The process is dramatic in some local areas. At the national level, individual losses appear small, but the cumulative effect can adversely impact domestic and international production.

The concerns about wise use of prime lands are local, Statewide, and national in scope. The loss of land suitable for sustained crop and wood production in a region or locality can influence the viability of supporting supply, processing, and marketing facilities. Continued loss of farmland, range, and forest land production affects the economy locally, influencing employment and income levels. In addition, it limits other qualities essential to the well-being of our people.

Land use alternatives are generally available that can minimize impacts on prime lands. Such alternatives should be explored carefully, particularly where Federal funds are involved. When possible, land use decisions should be avoided which irrevocably commit prime lands to nonfarmland, nonrange, and nonforestland uses, thereby foreclosing the options of future generations. USDA will urge all agencies to adopt the policy that Federal activities that take prime agricultural land should be initiated only when there are no suitable alternative sites and when the action is in response to overriding public need. The long-term implications of these land use conversions on the productive capacity of our farmland, range, and forest land, as well as on environmental impacts, should be evaluated and made known to the public.

The Department, through the Land Use Committee, counterpart State and local committees, and the activities of all concerned agencies, groups, and organiza-

tions will advocate the protection of prime and unique farmlands, range, and forest lands from premature or unnecessary conversion to nonagricultural land use. Urban or built-up uses and water impoundments that preclude utilization or recovery to high quality agriculture or forestry purposes are of particular concern.

State and local interests in retaining prime farmland, range, and forest land for production are often based on concerns other than the demands for food, forage, fiber, or timber. Open space, environmental quality, visual quality, and local economic impacts are often cited as reasons for protecting these lands. Many of these lands have modest production capability, but are valued because of location and other unique factors that make them of State or local importance. Retaining farmland, range, and forest land enhances local values and protects resource options for the future. The Department will make specific efforts to assist States and localities to identify lands of State and local concern and support efforts to protect these lands from premature or unnecessary conversion to other uses.

The Statement on Land Use Policy (Secretary's Memorandum No. 1827) and the following specific policies are set forth for the guidance of the agencies in this Department in regard to prime lands:

1. Advocate the protection of prime lands from premature or unnecessary conversion to other land uses. Priority will be given to prime lands threatened by conversion to irreversible land uses.
2. Assure that environmental impact statement procedures and review processes thoroughly consider and evaluate the impact of major Federal actions on prime farmland, range, and forest lands.
3. Emphasis will be placed on programs to inventory, assess, and evaluate the Nation's farmland, range, and forest lands to assist decisionmakers and the general public's understanding of the kind, extent, location, and current status of prime lands.
4. Cooperative efforts with States, local governments, and universities will be initiated to assure concerns for food, fiber, and wood production are recognized and emphasized in the identification of prime lands.
5. USDA agency actions and programs will give thorough consideration to the local, State, and national concerns for the retention of prime lands. The necessity of conversion of these lands to other uses will be considered only after a determination that feasible alternatives do not exist or that overriding public needs warrant the action.
6. The agencies in the Department will review their programs to insure consistency with the intent of this supplement.

John A. Knebel
Acting Secretary

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